

[0028] The Session Manager 306 can be further configured to enforce access rights and usage policies for the MMS system. For example, the MMS system can be configured to control or “lock-down” the set of users that have access to the system and which services said users have access to. For example, the system can be configured such that only users who have been affirmatively granted access can connect to the system. Alternatively, the Media Messaging Services can be configured in “open mode,” in which any user is allowed to register with the system and interact with other users using any service. Alternatively, the system can be configured in a combination of lockdown mode and open mode.

[0029] FIG. 1 is a diagram illustrating lock-down mode. In the example of FIG. 1, two MMS systems 100 and 110 are illustrated side by side. Each system comprises an MMS server, 102 and 112, respectively. Users A1-A4 have been locked down by server 102 and users B1-B4 have been locked down by server 112. Therefore, users A1-A4 cannot access server 112 and users B1-B4 cannot access server 102.

[0030] FIG. 2 is a diagram illustrating a MMS 200 comprising a MMS server 202 configured to operate in open mode. Thus, any user, e.g., A1, B1, C1, and D1 can register with, and access the server 202.

[0031] Services and/or users can be locked down at any level of granularity. For example, each type of communication service can be locked down on a service basis. For another example, a particular MMS system could have open email services but locked down voice services, such as where users can only make voice calls within the same network but can send email to any user inside or outside the local MMS network. Alternatively, an MMS server can lock down capabilities based on a combination of user constraints and services constraints, for example allowing a first user to make voice calls but not a second user.

[0032] MMS Server 300 can further comprise an Inter-Server Communication Manager (ISCOM) 304 configured to interconnect one MMS Server 300 to another MMS Server 300. ISCOM 304 can be configured to create a network of MMS Servers 300, allowing MMS devices 314, 316 on different MMS Servers 300 to communicate with each other using the same applications and interfaces used to communicate between MMS devices 314, 316 of a single MMS Server 300.

[0033] ISCOM 304 can be configured to allow a first MMS Server 300 to communicate with another MMS Server 300, thereby facilitating information and media exchange among users on disparate systems. For example, an MMS user on a first MMS Server 300 can communicate via ISCOM 304, through messages or calls, with MMS users on a second MMS Server 300. Such inter-server communication can be transparent and appear to users as if the users of both servers are logged into the same server. Configuration of ISCOM 304 can require MMS Servers 300 to communicate with each other and can require additional configuration.

[0034] ISCOM 304 can be further configured to address access rights and lock-down of features on a per-server basis. For example, ISCOM 304 of a first MMS Server 300 can be configured to block certain features for users of a second MMS Server 300. For another example, ISCOM 304 can be configured to apply certain permissions and access

rights for interconnected MMS Servers 3000 based on different server group policies.

[0035] The term “message” is intended to refer to any form of communication between a sender and a recipient that contains static content, meaning the entire contents of the message are known at the time of sending. In certain embodiments the sender initiates a request to pass a message to the recipient. In such embodiments, the message is automatically routed to the recipient. If a recipient does not want to receive a message from a particular sender, a restriction can be assigned on the server. Otherwise, in all instances, the only way a recipient can refuse to acknowledge a message from the sender is by not opening it. In many implementations, however, the message would still be considered delivered even if it was unopened.

[0036] A message can contain any type of media, including any binary or textual data, which can be stored in the optional body, subject, or attachment of the message. The overall size of the message, and of its individual components (e.g. body, subject, attachment), can either be fixed at a maximum value or variable. Any mechanism or protocol can be used to deliver messages from the sender to the recipient. The mechanism or protocol used will depend on the particular implementation.

[0037] Message-based communication can be used to conduct conversations. An n-way conversation, meaning a conversation connecting n users, can be conducted as a series of one-way message exchanges. FIG. 4 illustrates a 2-way conversation (between two users). In certain embodiments, the 2-way conversation depicted in FIG. 4 can be a full-duplex 2-way communication. Further, devices A1 and B1 can comprise push-to-talk functionality for voice communication. Arguably, in certain embodiments, the push-to-talk communication can be full-duplex communication.

[0038] Messages can also be broadcast from a single sender to multiple recipients. This can be implemented as several one-way message exchanges from the sender to each recipient. FIG. 5 illustrates a message broadcast. As shown in FIG. 5, user A1 sends the same message to users B1, C1, and D1 via a single broadcast message “Hello.” Users B1, C1, and D1 then respond individually to user A1 via unicast (single-recipient) messages.

[0039] In general, “call” refers to another abstract form of communication that can comprise real-time, full-duplex communication between the participants. According to certain embodiments, a sender can request to initiate a call with one or more recipients. A call can comprise any type of dynamic multimedia data including text, audio, and video. Numerous mechanisms or protocols can be used to initiate a call, depending on the specific implementation. According to certain embodiments of the present invention, the MMS Server 300 can be configured to record and store all calls in the Media Store 310. Unlike a message, calls must be requested by a sender and accepted by the recipient(s). Upon receiving a call request, the recipient can choose to accept or reject the call.

[0040] Calls can further be used for communication between more than two users at the same time (n-way). Whereas n-way conversations based on messages can consist of multiple one-way exchanges, n-way conversations based on calls can consist of full-duplex communication.